

We Claim:

1. A computer architecture for tracking a plurality of objects, wherein the computer architecture is coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, the computer architecture comprising:

an event table for storing the event information;

a rule execution component, coupled to the event table, that processes the event information in accordance with at least one rule, wherein the at least one rule comprises immediate rules; and

an event engine component, coupled to the status tracking structure and the event table, that receives the event information, stores the event information in the event table and, in response to the receipt of the event information, causes the rule execution component to process the event information in accordance with at least a portion of the immediate rules.

2. The computer architecture of claim 1, wherein the at least one rule comprises periodic rules, the computer architecture further comprising:

a configuration engine component, coupled to the rule execution component, that periodically causes the rule execution component to process the event information in accordance with at least some of the periodic rules.

3. The computer architecture of claim 1, wherein the event information comprises location information corresponding to the plurality of objects.

4. The computer architecture of claim 1, wherein the event information comprises environmental information corresponding to the plurality of objects.

5. A computer architecture for tracking a plurality of objects, wherein the computer architecture is coupled to a status tracking structure that provides event

information regarding at least a portion of the plurality of objects, the computer architecture comprising:

an event table for storing the event information;

a rule execution component, coupled to the event table, that processes the event information in accordance with at least one rule, wherein the at least one rule comprises periodic rules; and

a configuration engine component, coupled to the rule execution component, that periodically causes the rule execution component to process the event information in accordance with at least a portion of the periodic rules.

6. The computer architecture of claim 5, wherein the configuration engine component associates at least one execution frequency with the at least one periodic rule such that the portion of the at least one periodic rule is executed with a frequency different from other rules of the at least one rule.

7. The computer architecture of claim 5, wherein the event information comprises location information corresponding to the plurality of objects.

8. The computer architecture of claim 5, wherein the event information comprises environmental information corresponding to the plurality of objects.

9. A computer architecture for tracking a plurality of objects, wherein the computer architecture is coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, the computer architecture comprising:

an event table for storing the event information;

a rule storage component; and

a rule execution component, coupled to the event table and the rule storage component, that processes the event information in accordance with at least one rule stored in the rule storage component, and wherein the rule storage component permits modification of any of the at least one rule independent of the rule execution component.

10. The computer architecture of claim 9, further comprising:

an event engine component, coupled to the status tracking structure and the event table, that receives the event information, stores the event information in the event table and, in response, causes the rule execution component to process the event information in accordance with at least one immediate rule of the at least one rule.

11. The computer architecture of claim 9, further comprising:

a configuration engine component, coupled to the rule execution component, that periodically causes the rule execution component to process the event information in accordance with at least one periodic rule of the at least one rule.

12. The computer architecture of claim 9, wherein the event information comprises location information corresponding to the plurality of objects.

13. The computer architecture of claim 9, wherein the event information comprises environmental information corresponding to the plurality of objects.

14. A computer architecture for tracking a plurality of objects, wherein the computer architecture is coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, the computer architecture comprising:

an event table for storing the event information; and

an event dispatcher, coupled to the event table, that accesses the event table, when requested by a client in communication with the computer architecture, and sends information regarding at least a portion of the event information to the client.

15. The computer architecture of claim 14, further comprising:

a configuration engine component, operably coupled to the client, that provides at least one polling interval to the client, wherein the client sends event information requests to the event dispatcher based on the at least one polling interval.

16. The computer architecture of claim 14, wherein the event dispatcher causes the information regarding the at least a portion of the event information to be sent to the client via SOAP-enabled Web Services.

17. A computer architecture for tracking a plurality of objects, wherein the computer architecture is coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, the computer architecture comprising:

an event table for storing the event information;

an alert table for storing alerts;

a rule execution component, coupled to the event table, that processes the event information in accordance with at least one rule stored in the rule storage component, and that stores the alerts in the alert table when any of the at least one rule is violated; and

an event dispatcher, coupled to the rule execution component and the alert table, that accesses the alert table, when requested by a client, and sends information regarding at least a portion of the alerts to the client.

18. The computer architecture of claim 17, further comprising:

a configuration engine component, operably coupled to the client, that provides at least one polling interval to the client, wherein the client sends alert requests to the event dispatcher based on the at least one polling interval.

19. The computer architecture of claim 17, wherein the event dispatcher causes the information regarding the at least a portion of the alerts to be sent to the client via SOAP-enabled Web Services.

20. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, a client device that communicates with the tracking manager, the client device comprising:

a communication interface for communicating with the tracking controller;
a processing device coupled to the communication interface; and
a memory, coupled to the processing device, comprising executable instructions
that, when executed by the processing device, cause the client device to comprise:

a map controller that, in response to configuration information provided by the
tracking manager, periodically requests the event information from the tracking manager.

21. The client device of claim 20, wherein the map controller requests map
data from the tracking manager.

22. The client device of claim 21, wherein the map controller requests a
portion of the event information corresponding to the map data.

23. The client device of claim 22, further comprising a display, coupled to the
processing device, that displays the portion of the event information corresponding to the
map data.

24. The client device of claim 23, wherein the portion of the event information
corresponding to the map data is sent to the device via SOAP-enabled Web Services.

25. The client device of claim 20, wherein the configuration information
comprises at least one polling interval provided by the tracking manager, wherein the
map controller periodically requests the event information based on the at least one
polling interval.

26. In a system for tracking a plurality of objects comprising a tracking
manager coupled to a status tracking structure that provides event information regarding
at least a portion of the plurality of objects, a client device that communicates with the
tracking manager, the client device comprising:

a communication interface for communicating with the tracking controller;
a processing device coupled to the communication interface; and

a memory, coupled to the processing device, comprising executable instructions that, when executed by the processing device, cause the client device to comprise:

an alert controller that, in response to configuration information provided by the tracking manager, periodically requests alerts from the tracking manager.

27. The client device of claim 26, further comprising a display, coupled to the processing device, that displays a graphic indicative of a number of alerts at each of a plurality of alert levels.

28. The client device of claim 26, wherein the alerts provided by the tracking manager are sent to the device via SOAP-enabled Web Services.

29. The client device of claim 26, wherein the configuration information comprises at least one polling interval provided by the tracking manager, wherein the alert controller periodically requests the alerts based on the at least one polling interval.

30. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, a method in the tracking manager comprising:
receiving the event information; and
processing the event information in accordance with at least one immediate rule in response to receipt of the event information.

31. The method of claim 30, wherein processing of the event information further comprises processing the event information in accordance with periodic rules of the at least one rule.

32. The method of claim 30, wherein the event information comprises location information corresponding to the plurality of objects.

33. The method of claim 30, wherein the event information comprises environmental information corresponding to the plurality of objects.

34. A computer-readable medium having computer-executable instructions stored thereon for performing the method of claim 30.

35. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, a method in the tracking manager comprising:
receiving the event information; and
processing the event information in accordance with at least one periodic rule in response to receipt of the event information.

36. The method of claim 35, wherein the event information comprises location information corresponding to the plurality of objects.

37. The method of claim 35, wherein the event information comprises environmental information corresponding to the plurality of objects.

38. A computer-readable medium having computer-executable instructions stored thereon for performing the method of claim 35.

39. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, a method in the tracking manager comprising:
receiving the event information;
receiving an event information request from a client in communication with the tracking manager; and
sending, in response to the event information request, information regarding at least a portion of the event information to the client.

40. The method of claim 39, further comprising:
providing at least one polling interval to the client,
wherein the event information request is sent by the client based on the at least one polling interval.

41. The method of claim 39, wherein the information regarding the at least a portion of the event information is sent to the client via SOAP-enabled Web Services.

42. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, a method in the tracking manager comprising:
receiving the event information;
processing the event information in accordance with at least one rule;
generating at least one alert when any of the at least one rule is violated;
receiving an alert request from a client in communication with the tracking manager; and
sending, in response to the alert request, information regarding at least a portion of the at least one alert to the client.

43. The method of claim 42, further comprising:
providing at least one polling interval to the client,
wherein the alert request is sent by the client based on the at least one polling interval.

44. The method of claim 42, wherein the information regarding the at least a portion of the at least one alert is sent to the client via SOAP-enabled Web Services.

45. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, and a client device that communicates with the tracking manager, a method in the client device comprising:

receiving at least one polling interval from the tracking manager;
sending, to the tracking manager, an event information request based on the at least one polling interval; and
receiving, from the tracking manager in response to the event information request, information regarding at least a portion of the event information.

46. The method of claim 45, further comprising:
sending a map data request to the tracking manager; and
receiving map data from the tracking manager in response to the map data request.

47. The method of claim 46, wherein the event information request is based at least in part upon the map data, wherein the portion of the event information corresponds to the map data.

48. The method of claim 47, further comprising:
displaying the portion of the event information.

49. The method of claim 45, wherein receiving the information regarding the at least a portion of the event information further comprises receiving the information regarding the at least a portion of the event information via SOAP-enabled Web Services.

50. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, and a client device that communicates with the tracking manager, a method in the client device comprising:

receiving at least one polling interval from the tracking manager;
sending, to the tracking manager, an alert request based on the at least one polling interval; and
receiving, from the tracking manager in response to the alert request, information regarding at least a portion of alerts stored by the tracking manager.

51. The method of claim 50, further comprising:
displaying a graphic indicative of a number of alerts at each of a plurality of alert levels.

52. The method of claim 50, wherein receiving the information regarding the at least a portion of the alerts further comprises receiving the information regarding the at least a portion of the alerts via SOAP-enabled Web Services.

53. A computer-readable medium having stored thereon a data structure for use in providing a map display, the data structure comprising:

an image identification of an image depicting a geographic area;

at least one location entry descriptive of at least one location within the geographic area, wherein each of the at least one location entry comprises a location identification and spatial coordinates defining a location of the at least one location relative to the image; and

at least one label entry, each of the at least one label entry comprising display data to be displayed in conjunction with the image, spatial coordinates defining where the display data is to be displayed relative to the image and at least one target entry indicative of at least one other data structure to be accessed for display if the display data is selected.

54. The computer-readable medium of claim 53, wherein the at least one other data structure comprises at least one child data structure corresponding to at least one child geographic area encompassed by the geographic area.

55. The computer-readable medium of claim 53, wherein the at least one other data structure comprises at least one parent data structure corresponding to at least one parent geographic area that encompasses the geographic area.

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56. The computer-readable medium of claim 53, wherein the data structure is included as a child data structure within a parent data structure corresponding to a parent geographic area that encompasses the geographic area.

57. The computer-readable medium of claim 53, wherein the geographic area comprises a national-based geographic area.

58. The computer-readable medium of claim 53, wherein the geographic area comprises a regional-based geographic area.

59. The computer-readable medium of claim 53, wherein the geographic area comprises a facility-based geographic area.

60. In a system for tracking a plurality of objects comprising a tracking manager coupled to a status tracking structure that provides event information regarding at least a portion of the plurality of objects, and a client device that communicates with the tracking manager, a method in the client device comprising:

sending, to the tracking manager, an initialization request; and
receiving, from the tracking manager in response to the initialization request, information instructing the client to access a predetermined location to access initialization information.

61. The method of claim 60, further comprising:
accessing the predetermined location to obtain a map controller; and
accessing the predetermined location, via the map controller, to obtain map configuration information.